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APPLICATION NO.	FILING DATE	FILING DATE FIRST NAMED INVENTOR		CONFIRMATION NO.
09/832,865	04/12/2001	Hua Yu	USF-T142X	1377
	90 04/08/2004		EXAMINER	
Jeff Lloyd, Esq. Saliwanchik, Lloyd & Saliwanchik			GAMBEL, PHILLIP	
2421 N.W. 41st	Street, Suite A-1		ART UNIT	PAPER NUMBER
Gainesville, FL	32606-6669		1644	
			DATE MAILED: 04/08/2004	

Please find below and/or attached an Office communication concerning this application or proceeding.

		Applicati	on No.	Applicant(s)			
Office Action Summary							
		09/832,8		YU, HUA			
	,	Examine		Art Unit			
	The MAIL ING DATE of this communicat	Phillip Ga		1644			
The MAILING DATE of this communication appears on the cover sheet with the correspondence address Period for Reply							
A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.  - Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.  - If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.  - If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.  - Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).							
Status							
2a) <u></u> □	Responsive to communication(s) filed on <u>30 September 2003 and 20 January 2004</u> .  This action is <b>FINAL</b> .  2b) This action is non-final.  Since this application is in condition for allowance except for formal matters, prosecution as to the merits is						
	closed in accordance with the practice under <i>Ex parte Quayle</i> , 1935 C.D. 11, 453 O.G. 213.						
Disposition of Claims							
4) Claim(s) 1-15 is/are pending in the application.  4a) Of the above claim(s) 10-15 is/are withdrawn from consideration.  5) Claim(s) is/are allowed.  6) Claim(s) 1-9 is/are rejected.  7) Claim(s) is/are objected to.  8) Claim(s) are subject to restriction and/or election requirement.  Application Papers							
9)☐ The specification is objected to by the Examiner.							
10)☐ The drawing(s) filed on is/are: a)☐ accepted or b)☐ objected to by the Examiner.							
	Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).						
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).  11) The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.							
Priority under 35 U.S.C. § 119							
<ul> <li>12) Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).</li> <li>a) All b) Some * c) None of:</li> <li>1. Certified copies of the priority documents have been received.</li> <li>2. Certified copies of the priority documents have been received in Application No</li> <li>3. Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).</li> <li>* See the attached detailed Office action for a list of the certified copies not received.</li> </ul>							
Attachmen	t(s)						
1) Notice of References Cited (PTO-892)  4) Interview Summary (PTO-413)							
3) 🛛 Inform	e of Draftsperson's Patent Drawing Review (PTO-9 nation Disclosure Statement(s) (PTO-1449 or PTO r No(s)/Mail Date		Paper No(s)/Mail [5] Notice of Informal 6) Other:	Date´. Patent Application (PTO-152)			

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## **DETAILED ACTION**

1. Applicant's election of the species GM-CSF and IL-12, filed 1/20/04, is acknowledged.

Applicant's previous election of Group I (claims 1-9) and the species A (tumor cells) has been previously acknowledged.

Claims 10-15 have been withdrawn from consideration by the examiner 37 CFR 1.142(b), as being drawn to a nonelected inventions and/or species.

- 2. The filing date of the instant claims is deemed to be the filing date of priority application USSN 60/196,489, filed 4/12/00.
- 3. The title of the invention is not descriptive. A new title is required that is clearly indicative of the invention to which the claims are directed. Applicant should restrict the title to the claimed invention.
- 4. The application is required to be reviewed and all spelling, TRADEMARKS, and like errors corrected.

"BALB/c" is the proper designation of this mouse strain.

While it appears that applicant is in compliance with the Sequence Rules, applicant is required to review the instant application for compliance with the requirements of an application which contains sequence disclosure that are encompassed by the definitions for nucleotide and/or amino acid sequences set forth in 37 CFR 1.821-1.825. If the instant application does not have an appropriate SEQ ID NO: for each disclosed sequence, then applicant must comply with the Sequence Rules as set forth in 37 CFR 1.821-1.825.

Applicant is required to identify the nucleotide and amino acid sequences in the specification with SEQ. ID NOS.

Trademarks should be capitalized or accompanied by the ™ or ® symbol wherever they appear and be accompanied by the generic terminology. Although the use of trademarks is permissible in patent applications, the proprietary nature of the trademarks should be respected and every effort made to prevent their use in any manner which might adversely affect their validity as trademarks.

Appropriate corrections are required

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5. The following is a quotation of the appropriate paragraphs of 35 U.S.C. § 102 that form the basis for the rejections under this section made in this Office Action:

A person shall be entitled to a patent unless --

- (e) the invention was described in (1) an application for patent, published under section 122(b), by another filed in the United States before the invention by the applicant for patent or (2) a patent granted on an application for patent by another filed in the United States before the invention by the applicant for patent, except that an international application filed under the treaty defined in section 351(a) shall have the effects for purposes of this subsection of an application filed in the United States only if the international application designated the United States and was published under Article 21(2) of such treaty in the English language.
- 6. Claims 1-9 are rejected under 35 U.S.C. § 102(e) as being anticipated by Hoo (U.S. Patent No. 6,482,407) (see entire document).

Hoo teaches administering modified tumor cells as tumor vaccines which comprise CD40 (e.g. see column 7, paragraph 3; column 19, paragraph 1) as well GM-CSF and IL-12 (e.g. see columns 3-4; column 10, paragraph 3; column 18, paragraph 2 -column 19, paragraph 1; column 21, paragraph 4; Table 1 on column 5), including inactivating said modified tumor cells by various methods including irradiation (e.g. see column 10, paragraph 4). Therefore, Hoo teach the expression of GM-CSF and CD40 separately or as a fusion protein. Hoo teach the use of expression vectors useful in the cellular vaccines (e.g. column 12, paragraph 3 - column 13, paragraph 1). In addition, Hoo teaches the use of immunostimulatory molecules such as cytokines, including GM-CSF and IL-12 to increase immune responses in the referenced methods. (see column 20, paragraph 1). Given that the tumor cells can be obtained from the patient or not; the modified tumor cells encompass both autologous and heterologous cells. Further, Hoo teaches the known methods of administration encompassed by instant claim 9 (see column 21, paragraphs 1-2). Applicant is reminded that no more of the reference is required than that it sets forth the substance of the invention. The claimed functional limitations would be inherent properties of the referenced methods of administering tumor cells modified with costimulatory and/or cytokines, including CD40, GM-CSF and IL-12. It does not appear that the claim language or limitations result in a manipulative difference in the method steps when compared to the prior art disclosure

- 7. No claim is allowed.
- 8. Any inquiry concerning this communication or earlier communications from the examiner should be directed to Phillip Gambel whose telephone number is (571) 272-0844. The examiner can normally be reached Monday through Thursday from 7:30 am to 6:00 pm. A message may be left on the examiner's voice mail service. If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Christina Chan can be reached on (571) 272-0841.

The fax number for the organization where this application or proceeding is assigned is 703-872-9306.

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Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see http://pair-direct.uspto.gov. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

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Phillip Gambel, PhD.

**Primary Examiner** 

Technology Center 1600

April 5, 2004